

REMARKS

Generally

By this amendment and response, Claims 51, 52, 54, and 56 have been amended. Claims 66-68 have been added. The new claims for treating a subject at risk of developing cirrhosis are supported throughout the specification, as for example, at page 15, lines 3-10.

Obviousness-Type Double Patenting Rejection

The June 2, 2003 Office Action rejected Claims 26 and 27 under judicially created obviousness-type double patenting over Claim 11 of USPN 6248725. Pursuant to 37 CFR 1.321(c), Applicants are willing to file a terminal disclaimer relating to Claims 26 and 27 upon allowance of the pending claims.

Claim Objections

Claim 51 was objected to because it contained the abbreviation HGF without prior definition in the claims. This informality has been corrected.

Claim Rejections—35 USC 112(1)

Claims 51-65 have been rejected because “the specification, while being enabling for a method for treating cirrhosis of the liver, does not reasonably provide enablement for a method of preventing cirrhosis of the liver” (June 2, 2003 Office Action, page 3). Solely to speed allowance and without prejudice to further prosecution, Applicants have amended Claim 51 to remove the

phrase “or preventing.” Thus, Claims 51-65 now are directed solely to a method of treating and are enabled according to the Office Action. Applicants respectfully request withdrawal of this rejection.

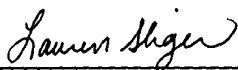
CONCLUSION

In view of the foregoing, it is submitted that the claims are allowable, and issuance of a Notice of Allowance is respectfully requested. The Commissioner is authorized to charge any fees required by the filing of these papers, and to credit any overpayment to Perkins Coie's Deposit Account No. **50-0665**. If Applicants can do anything more to expedite this application, Applicants ask the Examiner to contact the undersigned at (310) 788-9900.

Respectfully submitted,

PERKINS COIE LLP

Dated: August 29, 2003

By: 
Lauren Sliger
Reg. No. 51,086

Perkins Coie LLP
Patent – LA
P.O. Box 1208
Seattle, WA 98111-1208
Phone: (310) 788-9900
Fax: (310) 788-3399

Customer No. 34055

AMENDMENT OF THE CLAIMS

1-25. (Cancelled)

26. (Previously Amended) A method for improving the efficiency of *in vivo* liver cell retroviral transduction, the method comprising, inducing a semi-synchronous wave of *in vivo* liver cell proliferation by concurrently administering tri-iodothyronine (T3) and keratinocyte growth factor (KGF), and further comprising administering to the liver a retroviral vector complexed with cationic liposomes subsequent to the induction of liver cell proliferation, thereby increasing transduction efficiency.

27. (Previously Added) The method of claim 26, the cationic liposome comprising DiOctadecylamidoGlycylSpermine (DOGS).

28-50. (Cancelled)

51. (Presently Amended) A method for treating ~~or preventing~~ cirrhosis of the liver comprising concurrently administering to a subject an effective amount of T3 and an effective amount of KGF, thereby inducing a semi-synchronous wave of liver cell proliferation *in vivo*, and further comprising administering to a liver cell a retroviral vector complexed with cationic liposomes wherein the retroviral vector encodes hepatocyte growth factor (HGF), which treats ~~or prevents~~ cirrhosis of the liver.

52. (Currently Amended) The method of claim 51, wherein the effective amount of T3 ranges ~~is ranging~~ from about 400 µg per kg of body weight of the subject to about 40 mg per kg of body weight of the subject.

53. (Previously Added) The method of claim 52, wherein the effective amount of T3 is about 4 mg per kg of body weight of the subject.

54. (Currently Amended) The method of claim 51, wherein the effective amount of KGF ~~ranges is ranging~~ from about 100 µg per kg of body weight of the subject to about 10 mg per kg of body weight of the subject.

55. (Previously Added) The method of claim 54, wherein the effective amount of KGF is about 1 mg per kg of body weight of the subject.

56. (Presently Amended) The method of claim 51, wherein the effective amount of T3 and the effective amount of KGF is in a weight ratio of about 4:1.

57. (Previously Added) The method of claim 56, wherein the effective amount of T3 is in a dose of about 4 mg per kg of body weight of the subject and the effective amount of KGF is in a dose of about 1 mg per kg of body weight of the subject.

58. (Previously Added) The method of claim 57, wherein the composition is administered subcutaneously.

59. (Previously Added) The method of claim 57, wherein the composition is administered intravenously.

60. (Previously Added) The method of claim 57, wherein the composition is administered intramuscularly.

61. (Previously Added) The method of claim 57, wherein the composition is administered intraperitoneally.

62. (Previously Added) The method of claim 57, wherein the composition is administered directly into the liver.

63. (Previously Added) The method of claim 51, the cationic liposome comprising DiOctadecylamidoGlycylSpermine (DOGS).

64. (Previously Added) The method of claim 51, wherein the retroviral vector is administered between about 6 hours and 14 days after administration of the composition.

65. (Previously Added) The method of claim 51, wherein the retroviral vector is administered between about 24 hours and 8 days after administration of the composition.

66. (New) A method for treating a subject at risk of developing cirrhosis of the liver comprising concurrently administering to a subject an effective amount of T3 and an effective amount of KGF, thereby inducing a semi-synchronous wave of liver cell proliferation *in vivo*, and further comprising administering to a liver cell a retroviral vector complexed with cationic liposomes wherein the retroviral vector encodes hepatocyte growth factor, which treats the risk of developing cirrhosis of the liver.

67. (New) The method of claim 66, wherein the effective amount of T3 ranges from about 400 µg per kg of body weight of the subject to about 40 mg per kg of body weight of the subject, and the effective amount of KGF ranges from about 100 µg per kg of body weight of the subject to about 10 mg per kg of body weight of the subject.

68. (New) The method of claim 66, wherein the composition is administered subcutaneously, intravenously, intramuscularly, intraperitoneally, or directly into the liver, and wherein the cationic liposome comprises DiOctadecylamidoGlycylSpermine.